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By: _____


Sarah M. Barnett

PATENT

Customer Number: 22,852

Attorney Docket No. 04121.0116-08000

IN THE UNITED STATES PATENT AND TRADEMARK OFFICE

In re Application of:)
 Holly HOGREFE et al.) Group Art Unit: 1634
 Application No.: 10/738,917) Examiner: Thomas John O'FARRELL
 Filed: December 16, 2003)
 For: POLYMERASE ENHANCING) Confirmation No. 8386
 FACTOR (PEF) EXTRACTS, PEF)
 PROTEIN COMPLEXES, ISOLATED)
 PEF PROTEIN, AND METHODS FOR)
 PURIFYING AND IDENTIFYING)

MAIL STOP AMENDMENT

Commissioner for Patents
 P.O. Box 1450
 Alexandria, VA 22313-1450

Sir:

INFORMATION DISCLOSURE STATEMENT UNDER 37 C.F.R. § 1.97(b)

Pursuant to 37 C.F.R. §§ 1.56 and 1.97(b), Applicants bring to the attention of the Examiner the documents listed on the enclosed IDS Form PTO/SB/08. This Information Disclosure Statement is being filed, to the undersigned's knowledge, before the mailing date of a first Office Action on the merits for the above-referenced application.

Copies of some of the listed documents were previously submitted or were cited by the Examiner in at least one of parent U.S. Patent Application No. 09/399,003, filed September 20, 1999; parent U.S. Patent Application No. 08/957,709, filed October 24,

1997; and parent U.S. Patent Application No. 08/822,774, filed March 21, 1997; which Applicants rely upon for the benefits provided in 35 U.S.C. § 120, and accordingly copies of those documents are not enclosed.

Copies of the listed foreign and non-patent literature documents that were not cited in at least one of the parent applications are enclosed. Copies of the U.S. patents and patent publications are not enclosed.

Applicants respectfully request that the Examiner consider the listed documents and indicate that they were considered by making appropriate notations on the enclosed form.

This submission does not represent that a search has been made or that no better art exists and does not constitute an admission that each or all of the listed documents are material or constitute "prior art." If the Examiner applies any of the documents as prior art against any claim in the application and Applicants determine that the cited documents do not constitute "prior art" under United States law, Applicants reserve the right to present to the Office the relevant facts and law regarding the appropriate status of such documents.

Applicants further reserve the right to take appropriate action to establish the patentability of the claimed invention over the listed documents, should one or more of the documents be applied against the claims of the present application.

If there is any fee due in connection with the filing of this Statement, please
charge the fee to Deposit Account No. 06-0916.

Respectfully submitted,

FINNEGAN, HENDERSON, FARABOW,
GARRETT & DUNNER, L.L.P.

Dated: March 10, 2006

By: 

Michael R. Albrecht
Reg. No. 54,956
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By: *Sarah M. Barnett*

Sarah M. Barnett

IDS Form PTO/SB/08: Substitute for form 1449A/PTO				Complete if Known	
INFORMATION DISCLOSURE STATEMENT BY APPLICANT				Application Number	10/738,917
(Use as many sheets as necessary)				Filing Date	December 16, 2003
				First Named Inventor	Holly HOGREFE et al.
				Art Unit	1634
				Examiner Name	Thomas John O'FARRELL
Sheet	1	of	7	Attorney Docket Number	04121.0116-08000

U.S. PATENTS AND PUBLISHED U.S. PATENT APPLICATIONS					
Examiner Initials	Cite No. ¹	Document Number	Issue or Publication Date MM-DD-YYYY	Name of Patentee or Applicant of Cited Document	Pages, Columns, Lines, Where Relevant Passages or Relevant Figures Appear
		Number-Kind Code ² (if known)			
		US-4,376,110	03-08-1983	David et al.	
		US-4,683,202	07-28-1987	Mullis	
MAR 10 2005		US-4,795,699	01-03-1989	Tabor et al.	
		US-4,873,192	10-10-1989	Kunkel	
		US-4,921,794	05-01-1990	Tabor et al.	
		US-4,946,786	08-07-1990	Tabor et al.	
		US-5,001,050	03-19-1991	Blanco et al.	
		US-5,075,216	12-24-1991	Innis et al.	
		US-5,079,352	01-07-1992	Gelfand et al.	
		US-5,210,036	05-11-1993	Comb et al.	
		US-5,310,652	05-10-1994	Gelfand et al.	
		US-5,322,785	06-21-1994	Comb et al.	
		US-5,352,778	10-04-1994	Comb et al.	
		US-5,352,785	10-04-1994	Herzberg et al.	
		US-5,374,553	12-20-1994	Gelfand et al.	
		US-5,407,800	04-18-1995	Gelfand et al.	
		US-5,422,239	06-06-1995	Wands et al.	
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		US-5,436,149	07-25-1995	Barnes	
		US-5,449,603	09-12-1995	Nielson et al.	
		US-5,466,591	11-14-1995	Abramson et al.	
		US-5,474,796	12-12-1995	Brennan	
		US-5,489,523	02-06-1996	Mathur	
		US-5,500,363	03-19-1996	Comb et al.	
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**INFORMATION DISCLOSURE
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		US-6,183,997 B1	02-06-2001	Hogrefe	
		US-6,333,165 B1	12-25-2001	Hogrefe	
		US-6,379,553 B1	04-30-2002	Hogrefe	
		US-6,410,277 B1	06-25-2002	Barnes	
		US-6,444,428 B1	09-03-2002	Hogrefe	

Note: Submission of copies of U.S. Patents and published U.S. Patent Applications is not required.

FOREIGN PATENT DOCUMENTS

Examiner Initials	Copy Encl. ⁴	Cite No. ¹	Foreign Patent Document	Publication Date MM-DD-YYYY	Name of Patentee or Applicant of Cited Document	Pages, Columns, Lines, Where Relevant Passages or Relevant Figures Appear	Translation ⁶
			Country Code ³ Number ⁴ Kind Code ⁵ (if known)				
	Y		DE 196 12779A1	10-02-1997	Boehringer Mannheim GmbH		
	Y		EP 0 265 293 B1	04-27-1988	Tabor et al.		
	Y		EP 0 386 857 B1	09-12-1990	Tabor et al.		
	Y		EP 0 416 755 A1	03-13-1991	Chatterjee		
	Y		EP 0 502 589 A2	09-09-1992	Mullis et al.		
	N		EP 0 669 401 A2	08-30-1995	Cheng et al.		
	N		EP 0 669 401 A3	08-30-1995	Cheng et al.		
	N		EP 0 745 687	12-04-1996	Frey et al.		Abstract
	Y		EP 0 870 832 A1	10-14-1998	Takara Shuzo Co., Ltd.		
	Y		EP 0 997 530 A1	05-03-2000	Takara Shuzo Co., Ltd		
	Y		WO 89/06691 A2	07-27-1989	Gelfand et al.		
	Y		WO 91/02090 A1	02-21-1991	Burke et al.		
	Y		WO 92/06188 A2	04-16-1992	Barnes		
	Y		WO 92/06200 A1	04-16-1992	Gelfand et al.		
	Y		WO 92/09689 A1	06-11-1992	Mathur		
	Y		WO 94/26766 A A1	11-24-1994	Barnes		
	Y		WO 97/37038 A1	10-09-1997	Boehringer Mannheim GmbH		Abstract only
	Y		WO 98/42860 A1	10-01-1998	Stratagene		
	Y		WO 99/00506 A1	01-07-1999	Takara Shuzo Co., Ltd		Abstract only
	Y		WO 01/09347 A2	02-08-2001	Hogrefe et al.		
	Y		WO 01/09347 A3	02-08-2001	Hogrefe et al		
	Y		WO 01/16333 A1	03-08-2001	Allen et al.		

⁴ Copies that are not enclosed were previously submitted by the applicants or cited by the Examiner or are U.S. Patents or published applications.

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NON PATENT LITERATURE DOCUMENTS					
Examiner Initials ⁴	Copy Encl. ⁵	Cite No. ¹	Include name of the author (in CAPITAL LETTERS), title of the article (when appropriate), title of the item (book, magazine, journal, serial, symposium, catalog, etc.), date, page(s), volume-issue number(s), publisher, city and/or country where published.		Translation ⁶
	N		Albrecht et al., Swiss-Prot accession number Q01034, April 1, 1993.		
	Y		Anonymous, "Recombinant Vent _R ™ DNA Polymerase," <i>The Neb Transcript</i> , 1991, Vol. 3, page 4.		
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	N		Barnes, "PCR Amplification of up to 35-kb DNA with high fidelity and high yield from lambda bacteriophage templates," <i>Proc. Natl. Acad. Sci. USA</i> , 91:2216-2220 (1994).		
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	N		Brown et al., "Catalytic Plasticity of Fatty Acid Modification Enzymes Underlying Chemical Diversity of Plant Lipids," <i>Science</i> , 282:1315-1317 (1998).		
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	Y		Clark et al. "Novel blunt-end addition reactions catalyzed by DNA Polymerase I of <i>Escherichia coli</i> ," <i>Journal of Molecular Biology</i> , 198:123-127 (1987).		
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	N		Cohen et al., <i>Genomics</i> , 40(1):213-215 (1997)		
	Y		Deng et al., "Site-directed mutagenesis of virtually any plasmid by eliminating a unique site," <i>Analytical Biochemistry</i> , 200:81-88 (1992).		
	Y		Eckert et al., "Effect of reaction pH on the fidelity and processivity of exonuclease-deficient klenow polymerase," <i>J. Biol. Chem.</i> , 268:13462-13471 (1993).		
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	Y		Hall et al., "A rapid and efficient method for site-directed mutagenesis by PCR, using biotinylated universal primers and streptavidin-coated magnetic beads," <i>Protein Engineering</i> , 4(5):601 (1991).		
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⁴ Copies that are not enclosed were previously submitted by the applicants or cited by the Examiner or are U.S. Patents or published applications.

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NON PATENT LITERATURE DOCUMENTS					
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	Y		Lawyer et al., "High-level expression, purification, and enzymatic characterization of full-length <i>Thermus aquaticus</i> DNA polymerase and a truncated form deficient in 5' and 3' exonuclease activity," <i>PCR Methods and Applications</i> , 2:275-87 (1993).		
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NON PATENT LITERATURE DOCUMENTS		
	Y	Nieto et al., "Effects of temperature and pH on the regeneration of the amino groups of ovalbumin after modification with citraconic and dimethylmaleic anhydrides," <i>Biochem. Biophys. Acta.</i> , 749:204-210 (1983).
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	N	Seffernick et al., <i>J. Bacteriol.</i> , 183(8):2405-2410 (2001).
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Sheet	6	of	7		

NON PATENT LITERATURE DOCUMENTS			
	Y		Udy et al., "Microplate DNA preparation, PCR screening and cell freezing for gene targeting in embryonic stem cells," <i>BioTechniques</i> , 17(5):887-894 (1994).
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IDS Form PTO/SB/08: Substitute for form 1449A/PTO				Complete if Known	
INFORMATION DISCLOSURE STATEMENT BY APPLICANT				<i>Application Number</i>	10/738,917
(Use as many sheets as necessary)				<i>Filing Date</i>	December 16, 2003
				<i>First Named Inventor</i>	Holly HOGREFE et al.
				<i>Art Unit</i>	1634
				<i>Examiner Name</i>	Thomas John O'FARRELL
Sheet	7	of	7	<i>Attorney Docket Number</i>	04121.0116-08000

NON PATENT LITERATURE DOCUMENTS				
	Y		Amendment After Final filed November 7, 2003, in U.S. Patent Application No. 08/957,709, filed October 24, 1997.	
	Y		Advisory Action mailed April 20, 2004, in U.S. Patent Application No. 08/957,709, filed October 24, 1997.	
	Y		Amendment filed September 13, 2004, in U.S. Patent Application No. 08/957,709, filed October 24, 1997.	
	Y		Office Action mailed November 18, 2004, in U.S. Patent Application No. 08/957,709, filed October 24, 1997.	
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	Y		Office Action mailed March 25, 2003, in U.S. Patent Application No. 09/631,614, filed August 4, 2000.	
	Y		Amendment filed August 25, 2003, in U.S. Patent Application No. 09/631,614, filed August 4, 2000.	
	Y		Amendment (replacement) dated November 3, 2003, in U.S. Patent Application No. 09/631,614, filed August 4, 2000.	
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	Y		Advisory Action mailed August 23, 2005, in U.S. Patent Application No. 09/631,613, filed August 4, 2000.	
	Y		Response filed February 13, 2006, in U.S. Patent Application No. 09/631,613, filed August 4, 2000.	

Examiner Signature		Date Considered	
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EXAMINER: Initial if reference considered, whether or not citation is in conformance with MPEP 609. Draw line through citation if not in conformance and not considered. Include copy of this form with next communication to applicant.

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